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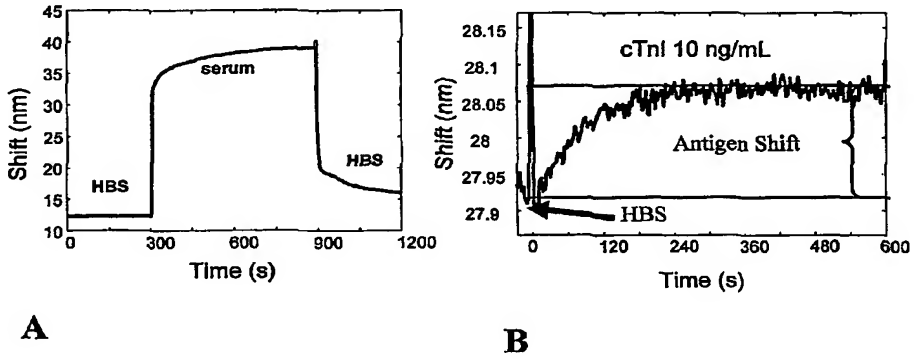
(54) Title: BIOCOMPATIBILE LINKERS FOR SURFACE PLASMON RESONANCE BIOSENSORS



(57) Abstract: A method of coating an SPR biosensor specific for an analyte to reduce protein fouling, the method has the steps of providing an SPR biosensor, providing a solution of 11-mercaptoundecanol; incubating the SPR biosensor in the 11-mercaptoundecanol solution to form a self-assembling monolayer (SAM); incubating the SPR with SAM in a solution of epichlorohydrin and diglyme; next incubating the SPR in ethanolamine; preparing a solution of EDCNHS and a biocompatible polymer; incubating the SPR from ethanolamine in the EDC/NHS/polymer solution; providing a ligand specific for the analyte in a solution; incubating the polymer-coated SPR in the ligand solution to permit the ligand to react with the polymer-coated SPR; washing the ligand-coated SPR to remove unreacted ligand, thereby providing an SPR capable of reacting with the analyte. Another method replaces the solution for the SAM layer with a solution of MHA or NHS-MHA with HT, and attaches the ligand to the resulting SAM layer.

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